

REMARKS

As a preliminary matter, applicants address the conflicting indications on the cover sheet and page 15 of the office action as to the nature of the office action being final or non-final. The PTO web-site image file wrapper section indicates that the action is a non-final action. This is consistent with the cover sheet. In addition, only a non-final action is appropriate given the new grounds of rejection that are asserted in the office action. The re-writing of dependent claims in independent form does not necessitate a change in the basis for rejection except when convincing arguments are made, and making a new rejection final under such circumstances is not permitted. Paragraph 24 of the office action indicates that the prior arguments regarding claims 19 and 22 were persuasive, and that a new rejection is applied in response. Accordingly, it is assumed that the paragraph on page 16 was included by mistake, and that the cover sheet and PTO web site correctly indicate the status of the July 14, 2005 office action as a non-final rejection.

To facilitate ready understanding by all readers, the remainder of this response will address points in the order presented in the office action. The numbering adopted in the office action paragraphs will be followed, and specific points raised by the examiner will be addressed in order.

Paragraphs 4-7 of the office action maintain the §102 rejection of claim 5 based upon Larsson. The examiner expressed in paragraphs 6 and 7 that claim 5 did not address the situation where a print service and print content are in different locations. The examiner's comments were considered, and an amendment is made to claim 5. By the amendment, the claim requires the reference to specify locations of both the print content and the print service.

This permits the reference to identify an adequate print service that the printer can use to resolve a print by reference operation. The print service device 210 in Larsson's system is shown in FIG. 5 and is part of the information service providers 200 illustrated in any of the embodiments in FIGS. 1-4 of Larsson. According to the invention, the reference can specify an appropriate print service for formatting of the content. The content and the formatting for the particular printer may not be available from the same source.

In Larsson, the print services 210 identified by the examiner are always part of the information service provider. If the information service provider lacks formatting information for the particular printer being used in a print by reference operation, that printer will not be able to be used for the presentation contemplated in Larsson's system beginning with a PDA 100. The invention in claim 5 permits the print by reference operation to address a print service and content that are in different locations. The content is retrieved and the print service is used to format the information for printing, for example.

In paragraphs 8 and 9 of the office action, the examiner addresses the rejection of claim 15. The rejection is maintained based upon the examiner's indication that the claim 15 requirement that the responsive signal identify "one or more of the print capabilities of the print device" is met by "the mere fact of a response from a printer". This is an incorrect interpretation of the claim, as it is inconsistent with the claim language and the specification. Print capabilities are defined as "information pertaining to the capabilities of the responsive print device 22. For example, the responsive signals may include information specifying whether the

print device 22 has color printing capabilities, whether the print device 11 is equipped for printing specialized graphics files and further specifying the costs associated with using the print device 22 to print a document.” P12, L21-26. In the case where there are multiple printers within range of a wireless device, this permits the selection of an appropriate printer by any number of capabilities that the printer might indicate in its responsive signal. Larsson contemplates no transmission of such printer capabilities.

Paragraphs 10-12 and 32-33 of the office action maintain the rejection of claim 18. The examiner indicates that it was not understood how the arguments related to the language of claim 18. On this point, there are two locations defined in claim 18. One location is “a location at which a print content is located on the network”. The second location is “a locator, the locator identifying a location of a print service.” According to claim 18, the reference includes both locations. The reference includes both locations “before wirelessly communicating the reference to the print device”. Larsson does not meet this. Larsson instead enables the printing from specialized ISPs 200 that each have print service devices 210. In Larsson’s system, it is assumed that the information service provider has a print service that will format information for printing. That assumption greatly limits the applicability of Larsson’s presentation system. There is no discussion that the reference that is transmitted to the print device in Larsson specifies the location of a print service. All of the portions cited by the examiner discuss the operations performed by the print service device 210 that is part of Larsson’s ISPs 200.

Paragraphs 13 and 14 address the rejection of claims 37-39. The office action again professes the position that the previous arguments do not relate to the

claim language. On this point, the first communication interface enables communication “between the portable wireless device and a print service”. The second communication interface enables communication “between the portable wireless device and a print device”. Larsson does not disclose a PDA that includes separate interfaces for communication with a print device and a print service.

Paragraphs 15-16 of the office action address claims 4 and 20. The examiner maintains that Saylor relates to “obtaining the content” and that Saylor teaches “passing billing information”. There is a billing module described in column 31, but it has absolutely nothing to do with a reference by which content may be printed for pay. It also does not discuss billing information being passed in any reference used to initiate a print (or any other operation, for that matter). The brief portion in column 31 discusses how a billing module receives billing information specific to a VPage. The user must have a prior account through a VCode registration system. The reference in the claims, on the other hand, is the reference from the computer that wirelessly communicates with a print device, and would not, for example, require that a previous account have been established (though such scenario is not excluded). This is the communication that requests a print service from a printer. The billing module in column 31 does not provide any suggestion to send a reference wirelessly to a printer that includes billing information in the reference.

The combination is also inappropriate. The motivation to modify has now changed and is stated, in paragraph 16, to be that “the idea of billing for content is old and well-known”. The problem with the analysis is that the claims are not directed to the general idea of pay for content, of which a book purchase is an old

example that fits the generalizations used to support the rejection. Such broad generalizations do not comport with the specificity necessary to combine the highly unrelated teachings of Larsson and Saylor. That content has been paid for in the past does not render every development that results in content delivery obvious. In any event, the claims are more concerned with a pay for print service, as the print reference includes billing data.

Paragraphs 17-19 address claim 21. Claim 21 is canceled, rendering this issue moot.

Paragraphs 19-23 address the rejection of claims 9-12 and 32-34 in view of Larsson, Takahashi and Yoon. Claims 9-12 and 32-34 stand rejected under § 103 in view of Larsson, Takahashi and Yoon. Regarding Takahashi, the examiner cites paragraphs 2 and 84-86 of Takahashi in response, but these paragraphs merely describe that the fingerprint security permits security among multiple computers that share a printer such that the printer authenticates a fingerprint with respect to the connected computer that sent it. This has nothing to do with printing by reference, and is a limited specific application of fingerprint security.

Takahashi's system is a fingerprint authentication system. According to Takahashi, a computer uses fingerprints to control the access to print information. There is absolutely no discussion of a print by reference operation. There is absolutely no discussion of the wireless initiation of a print by reference operation with a print device. The combination simply does not teach the features that are in the claims. In the claims, the security access code is sent along with the reference to initiate a print operation via a wireless medium. This permits, for example, printers in

commercial settings to be used by users having paid a subscription fee or otherwise paid for access, for example. It also permits, for example, employees of a company having a security access code to visit another company location and initiate a print by reference operation with a printer at the location. In the claims, the reference is sent to a print device, whereas in Takahashi there is a computer that is controlling the access. In sum, Takahashi has little to do with the particular scheme for security access that is contemplated in the print by reference operation in the claims.

Also, an artisan would not be motivated to combine Larsson with Takahashi. The user of a PDA is likely to keep the PDA on the person. The wireless device 100 in Larsson does not have the same security concerns that the personal computer and printer of Takahashi does. If Larsson were modified by Takahashi, the wireless device 100 in Larsson would require a fingerprint operation for access of the device and or the printer. This does still not result in the claimed invention because it does not suggest communicating any information in the reference for printing, and an artisan would not be motivated to make such a modification.

Regarding claims 11 and 34, the generality of “two communicating entities” passing “authentication values” does not suggest any particular modification of Larsson. Yoon, in contrast to Larsson, provides a web info shop. Yoon controls access to the web info shop and provides mechanisms for charging for use of the web info shop. In the claims, the security access code is transmitted wirelessly along with the print by reference operation. In claim 11 it enables access to print content that is at the network locations specified by the reference. Yoon, in contrast, discloses an interactive system where a response and authentication procedure are used to allow

access to a web info shop service. It is not at all clear how this could be used to modify Larsson's system. It is also not at all clear what this has to do with the communication of a security code that allows access to print content that is addressed in a print by reference operation.

Paragraphs 25-28 present a new rejection under 35 U.S.C. §112 of claims 37-39. The stated reason is the claims are "incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap between the necessary structural connections." Based upon the explanation, the examiner apparently views the print device as a "necessary structural element." This is an incorrect reading of the claim and a misinterpretation of the doctrine regarding omission of "essential structural cooperative relationships". In claim 37, the print device is used to define a capability of the second communication interface, namely that it be capable of wireless communication with a print device. As the print device is not an element of the claim, there is no missing "essential structural cooperative relationship." The rejection should be withdrawn.

There is a new basis asserted to reject claims 19 and 22, as the prior reference used in this regard did not qualify as prior art. As an initial matter, the substitution of references evinces what applicants pointed out in Amendment A is a hindsight reconstruction of the invention using the claims as a roadmap. The references used to modify Larsson have nothing to do with print by reference operations. The references only vaguely relate to some general billing and security issues in completely different systems. None of the references are concerned or address particular problems raised by a print by reference operation. No artisan would

have been motivated to look to the different references without having the roadmap provided by the features of the claimed invention as set forth in the present claims and application.

Paragraphs 29-40 of the office action state grounds for rejection of claims 5, 15, and 18 (based upon Larsson); claims 4 and 20 (Larsson/Saylor); claims 9-10, 12, 19 and 32-33 (Larsson/Takahashi); and claims 11 and 34 (Larsson/Takahashi/Yoon) that have been addressed in Amendment A, and full response to the examiner's additional explanation of these rejections (paragraphs 4-23 of the office action) has been made above. The full response above and the remarks in Amendment A are a full traversal of the rejection.

Paragraphs 41—43 of the office action state a new rejection of claim 21. Claim 21 has been canceled with this amendment. The rejection is moot.

Paragraphs 44-45 present a new rejection based upon Larsson and Ochiai (US 6,583,886). In claim 22, the computer that wirelessly communicates a reference identifying a location at which a print content is located on the network is also caused to add information to the reference before communicating the reference. This information includes a request for status. Column 8 of Ochiai defines a network protocol for a standard network having computers and printers. Print jobs are sent in standard network fashion. Status information is communicated, but no suggestion is made to include a status request in a reference that identifies a location at which a print content is stored. The generality of the rejection (and stated motivation) fails to comport with the language of the claim, which requires the computer to add information to the reference. The stated motivation is also inappropriate. Ochiai is

concerned with a network that has logically allocated printers and where it may be difficult for a user to determine the physical location of a printer being accessed. C1, L26-30. Larsson, on the other hand, permits mobile printing (abstract), where the user would be standing in the wireless range of the printer being used for printing. Ochiai does not suggest a need for “monitoring the print job” in such a case, and there is no basis in either reference to support the motivation stated by the examiner.

Claim 22 also stands rejected in view of Larsson and Bhogal, US Published Application 20030020944. Bhogal concerns “operating system software for printing documents”. [2]. Bhogal permits “displaying the print jobs in a scheduled print order, rescheduling the print jobs in a second scheduled print order, and printing the prints jobs in the second scheduled print order. Preferably, the print jobs are rescheduled in response to commands initiated by a user, such as the user prioritizing the print jobs. It is also preferred for the plurality of print jobs to be generated using one or more application programs running in a computer that is in communication with one or more printers. The method may further comprise spooling the plurality of print jobs onto a storage device of the computer to form a scheduled print order.” [10]. Once again, this has nothing to do with print by reference operations or the wireless initiation of print jobs. In Larsson, the presentation device 100 communicates with the printer, and nothing in Bhogal suggests modifying the reference used to initiate print by reference in Larsson. Bhogal is concerned with a standard PC/printer model that might have multiple print jobs. [18].

Paragraphs 50-52 state a 103 rejection of claims 37-39 based upon Larsson. To make this rejection, the wireless device 100 of Larsson is ignored

because it clearly lacks an interface to communicate with a print service as required by the claims. Instead, the office action turns to the communication device 300 of the printer and attempts to compare it to the claims. This is improper and ignores the clear teachings of Larsson. Claim 37 sets forth a portable device having two interfaces, where the second wireless communicates with a printer and the first with a print service. The only thing in Larsson that is properly compared to the claimed portable wireless device is the “telephone 100”. The attempt to compare part of the printer of Larsson to the claimed portable wireless device that wirelessly communicates with the reference fails to give the terms in either the reference or the claim their ordinary meaning.

Even with the stretched interpretation of Larsson, however, claim 37 is not met or suggested. Paragraph 51 states that the “communication device 300” communicates with a “print service 60” in Larsson. Item 60 in Larsson is the “company”. The only “print service” in Larsson is attached to the “ISPs 200”. The “print service devices 210” may address the “print file” (page 15) to the “communication device 300”, but there is nothing indicating that the communication device 300 “identifies the location of print content to the print service” as required by the claims.

Finally, the theory of the rejection seems to be that it would be obvious to make the “communication devices 300” wireless. This is also not supported by the reference. The communication devices 300 in Larsson “are connecting printers 380 to the network 10”. They may be external, internal or “embedded”. P13, L23-33. As there is a one-to-one correspondence between the “communication devices 300” and

the printers in Larsson (each printer has one) there is not need to "change the location of the wireless device" as stated by paragraph 52 of the office action. .

For all of the above reasons reconsideration and allowance of the application is respectfully requested. The rejections that were rendered moot by the cancellation of claims have not been specifically addressed. Should the examiner have any questions, the examiner is invited to contact the undersigned attorney if it would help to expedite prosecution.

Respectfully submitted,

GREER, BURNS & CRAIN, LTD.

By



Steven P. Fallon

Registration No. 35,132

September 13, 2005

300 South Wacker Drive, Suite 2500
Chicago, Illinois 60606
(312) 360-0080
Customer No. 24978

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